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LIST OF RELATED CASES

<u>Docket Number</u>	<u>Serial or Patent No.</u>	<u>Filing or Issue Date</u>	<u>Status or Patentee</u>
212607US0 DIV	09/927,395	08/13/01	PENDING
0010-1070-0*	09/466,935	12/20/99	PENDING

*Present application; listed for information.

212607



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What is claimed is:

1. A DNA coding for a protein as defined in the following (A) or (B):

- (A) a protein which comprises an amino acid sequence
5 shown in SEQ ID NO: 2 in Sequence Listing; or
(B) a protein which comprises an amino acid sequence
including deletion, substitution, insertion or
addition of one or several amino acids in the amino
acid sequence shown in SEQ ID NO: 2 in Sequence
10 Listing, and which has an activity of making a
bacterium having the protein L-homoserine-resistant.

2. The DNA according to claim 1, which is a DNA
as defined in the following (a) or (b):

- (a) a DNA which comprises a nucleotide sequence
15 of the nucleotide numbers of 557 to 1171 of a
nucleotide sequence shown in SEQ ID NO: 1 in Sequence
Listing; or

- (b) a DNA which hybridizes with the nucleotide
sequence of the nucleotide numbers of 557 to 1171 of
20 the nucleotide sequence shown in SEQ ID NO: 1 in
Sequence Listing under stringent conditions, and
which codes for the protein having the activity of
making the bacterium having the protein L-homoserine-
resistant.

25 3. A bacterium belonging to the genus

Related Pending Application

Related Case Serial No: 09/927,395

Related Case Filing Date: 02/02/01

Escherichia, wherein L-homoserine resistance of said bacterium is enhanced by amplifying a copy number of the DNA as defined in claim 1 in a cell of said bacterium.

5 4. The bacterium according to claim 3, wherein the DNA as defined in claim 1 is carried on a multicopy vector in the cell of said bacterium.

 5. The bacterium according to claim 3, wherein the DNA as defined in claim 1 is carried on a
10 transposon in the cell of said bacterium.

 6. A method for producing an amino acid, comprising the steps of:

 cultivating the bacterium as defined in any one of claims 3 to 5, which has an ability to produce the
15 amino acid, in a culture medium, to produce and accumulate the amino acid in the medium, and
 recovering the amino acid from the medium.

 7. The method according to the claim 6, wherein said amino acid is at least one selected from the
20 group consisting of L-homoserine, L-alanine, L-isoleucine, L-valine and L-threonine.

Abstract of the Disclosure

A bacterium which has an ability to produce an amino acid and in which a novel gene (*rhtB*) coding for a protein having an activity of making a
5 bacterium having the protein L-homoserine-resistant is enhanced, is cultivated in a culture medium to produce and accumulate the amino acid in the medium, and the amino acid is recovered from the medium.

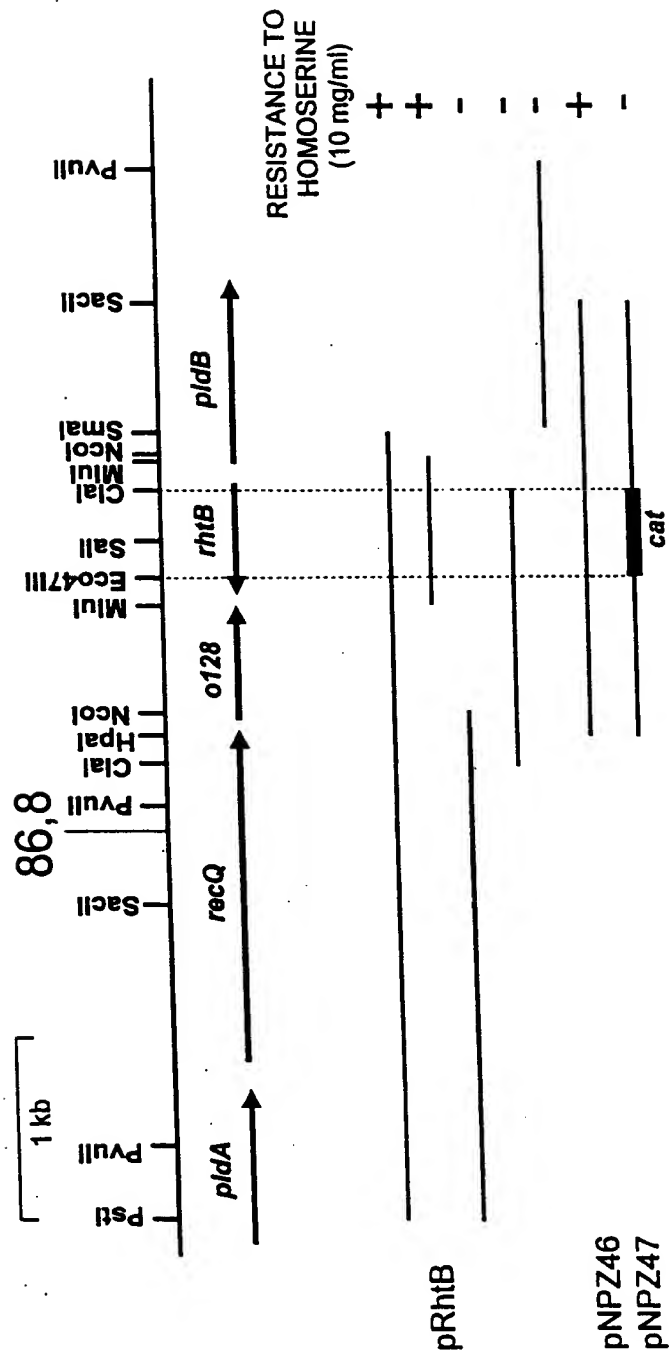


FIG. 1

Met	Thr	Leu	Glu	Trp	Trp	Phe	Ala	Tyr	Leu	Leu	Thr	Ser	Ile	Ile	Leu
1				5					10					15	
Thr	Leu	Ser	Pro	Gly	Ser	Gly	Ala	Ile	Asn	Thr	Met	Thr	Thr	Ser	Leu
			20					25					30		
Asn	His	Gly	Tyr	Pro	Ala	Gly	Gly	Val	Tyr	Cys	Trp	Ala	Ser	Asp	Arg
		35				40						45			
Thr	Gly	Asp	Ser	Tyr	Cys	Ala	Gly	Trp	Arg	Gly	Val	Gly	Thr	Leu	Phe
	50					55					60				
Ser	Arg	Ser	Val	Ile	Ala	Phe	Glu	Val	Leu	Lys	Trp	Ala	Gly	Ala	Ala
	65				70					75					80
Tyr	Leu	Ile	Trp	Leu	Gly	Ile	Gln	Gln	Trp	Arg	Ala	Ala	Gly	Ala	Ile
			85						90					95	
Asp	Leu	Lys	Ser	Leu	Ala	Ser	Thr	Gln	Ser	Arg	Arg	His	Leu	Phe	Gln
			100					105					110		
Arg	Ala	Val	Phe	Val	Asn	Leu	Thr	Asn	Pro	Lys	Ser	Ile	Val	Phe	Leu
		115					120					125			
Ala	Ala	Leu	Phe	Pro	Gln	Phe	Ile	Met	Pro	Gln	Gln	Pro	Gln	Leu	Met
	130					135					140				
Gln	Tyr	Ile	Val	Leu	Gly	Val	Thr	Thr	Ile	Val	Val	Asp	Ile	Ile	Val
	145				150					155					160
Met	Ile	Gly	Tyr	Ala	Thr	Leu	Ala	Gln	Arg	Ile	Ala	Leu	Trp	Ile	Lys
			165						170				175		
Gly	Pro	Lys	Gln	Met	Lys	Ala	Leu	Asn	Lys	Ile	Phe	Gly	Ser	Leu	Phe
		180						185					190		
Met	Leu	Val	Gly	Ala	Leu	Leu	Ala	Ser	Ala	Arg	His	Ala			
		195					200					205			

(SEQ ID NO: 2)

FIG. 2